## RESEARCH DEPARTMENT

# FICORD MICROPHONE TYPE FC 1200

Technological Report No. L-067/3 UDC 621.395.616.385.1 1966/34

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for Head of Research Department

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### FICORD MICROPHONE TYPE FC 1200

1. Supplier:

Ficord International. Made by Calder Recordings Ltd.

2. Description:

Electrostatic, valve operated, end-fire cardioid; mains unit and 19 m cable supplied. Standard windshield and experimental windshield of same

size also supplied.

3. Price to BBC:

£68

4. Appearance and Dimensions:

See Fig. 1.

5. Weight:

0.28 kg without cable.

6. Impedance:

Nominal value not stated, actual value 100 ohms.

7. Frequency Characteristics:

Characteristics of specimen tested without windshield see Fig. 2, and with windshield see Fig. 3.

Note:

Compared with Fig. 2, Fig. 3 shows a large dip in the axial response at 7.5 kHz and a degradation in the front-to-back ratio at low frequencies.

Spread in axial characteristics for four specimens without windshield is given in Fig. 4.

8. Sensitivity:

Mid-band sensitivity for the four samples tested ranges from -36 dB to -39 dB with reference to  $1 \text{ volt/N/m}^2$ .

### Noise and Interference:

9.1. Internally Generated Noise (weighted)

Equivalent mid-band sound level: +24 dB with reference to  $20\mu$  N/m<sup>2</sup>.

9.2. Magnetic Pickup (unweighted)

Frequency	Equivalent mid-band sound level with reference to 20 $\mu$ N/m $^2$ for 1 $\mu$ T		
50 Hz	+17 dB		
1 kHz	+29 dB		
10 kHz	+53 dB		

Note: These levels are extremely low.

## 9.3. Wind Noise (weighted)

Microphone Condition	Equivalent mid-band sound level dB with ref. to $20\mu  \text{N/m}^{2}$ forwind speed of 16 km/h.  Angle of Incidence			
	0°	90°	135°	180°
No windshield, unequalized No windshield, equalized Standard windshield,	106 107	100 101	103 104	96 97
unequalized Standard windshield, equalized Experimental windshield,	74 84	62 74	79 91	64 75
unequalized Experimental windshield, equalized	85 92	68 77	86 94	73 81

Note:

The figures for the equalized condition without a windshield are a few decibels higher than those for the average electrostatic cardioid microphone.

SMW

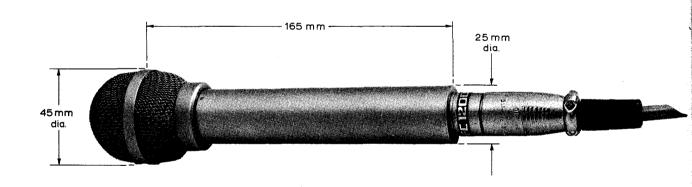


Fig. 1 External appearance and dimensions of Ficord microphone type FC 1200.

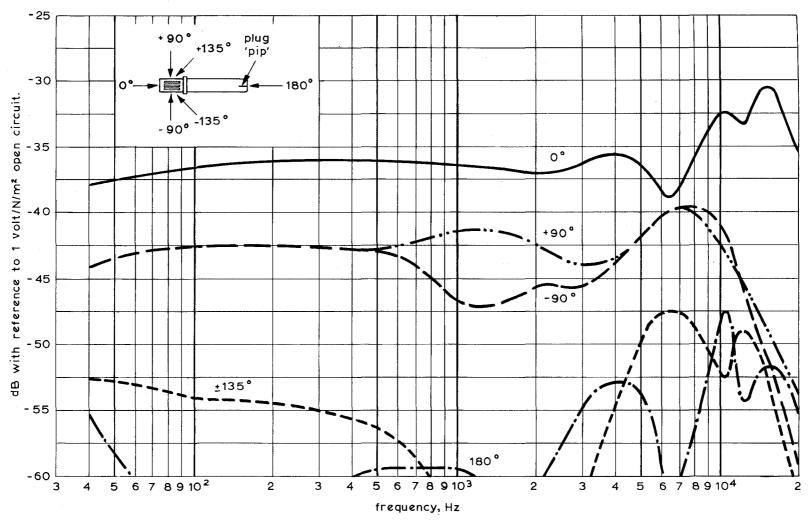


Fig 2. Frequency characteristics of Ficord microphone type FC 1200 without windshield. Serial No. 502.

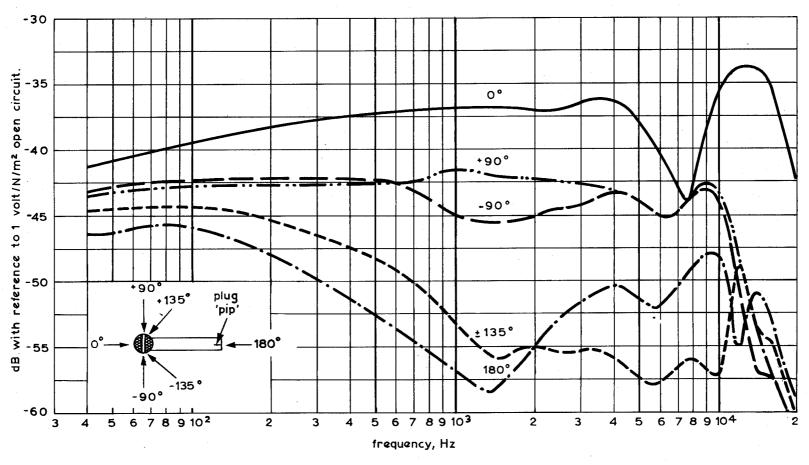


Fig. 3 Frequency characteristics of Ficord microphone type FC 1200 with windshield. Serial No. 502

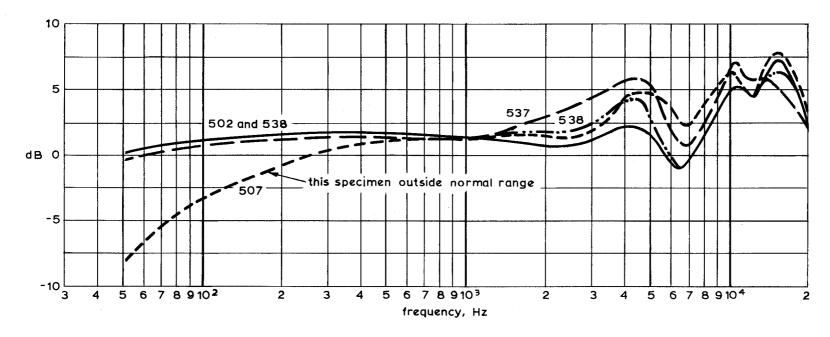


Fig. 4. Axial frequency characteristics of four specimens of Ficord microphone type FC 1200 without windshield.